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## **(G\*) Diagrammatic Renormalization for QCD Sum-Rules**

*Thursday 10 June 2021 13:02 (3 minutes)*

QCD sum-rule calculations contain loop-integration divergences associated with composite operators in correlation functions that must be renormalized to obtain physical predictions. The standard approach to renormalization through operator mixing can present technical challenges in situations where the basis of operators becomes large (e.g., for multi-quark operators). The BPH renormalization method provides an alternative to the standard method of operator mixing and Lagrangian counter-term renormalization. The BPH method consists of dividing Feynman diagrams into subdiagrams and subtracting the divergent part of each subdiagram. In this talk, I will present the BPH diagrammatic renormalization method and show an example of its application to the correlation function of gluon and mesonic composite operators.

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